

CONSTRUCTION CRAFT LABOR

A student who has completed the Job Corps Construction Craft Labor program is equipped with the skills to contribute to the workplace as a valued employee from day one. Competence in academic and career technical skills is required for graduation. Job Corps students learn employability and technological skills. To complete his or her Construction Craft Labor training, a student must master the following skills:

EMPLOYABILITY SKILLS

Demonstrate ability to dress appropriately for work, arrive on time and respond to supervision.

SAFETY

Demonstrate appropriate safety precautions when performing tasks and using tools; identify safe work site procedures; locate and properly operate fire safety equipment; select proper safety attire to wear on the job site including safety goggles and shoes and hardhats; demonstrate the ability to work safely with others on the job site, respond appropriately in emergency situations, handle and store chemicals safely consistent with OSHA requirements, work safely around construction equipment.

PRE-CONSTRUCTION TRAINING

Demonstrate construction safety practices; identify construction materials and tools; demonstrate the ability to move concrete blocks and bricks, move and stack lumber, move and stack sandbags, wheel sand and gravel, erect scaffolding; demonstrate form and grade construction, footing excavation, backfill and compaction.

COMMUNICATION SKILLS

Demonstrate ability to use hand signals, communicate well with other workers and ask and answer questions to understand job expectations.

PHYSICAL APTITUDE

Demonstrate good hand-eye coordination and ability to safely lift and carry heavy loads; maintain stamina for a full work shift.

OCCUPATIONAL KNOWLEDGE

Identify types, sizes and grades of lumber and plywood; demonstrate proper moving, stacking and storing techniques of lumber and construction materials; recognize various types of nails and fastening devices; understand the different uses of concrete reinforcing bar (rebar).

CONCRETE

Identify and use concrete-related materials; mix and place concrete; basic use of concrete tools, including maintenance of equipment.

SCAFFOLDING

Demonstrate scaffolding safety practices, including ladder safety and fall protection; identify scaffolding equipment; properly erect scaffolding.

MATH AND MEASUREMENTS

Perform math operations (addition, subtraction, division, multiplication) using whole numbers, fractions and decimals; read, understand and use a tape measure; measure dimensions, space and structures; calculate volume of various shapes; understand measuring instruments and their markings as feet, inches, millimeters and/or tenths or hundredths; correctly find plumb and level for a surface; demonstrate proper use of a hand level, transit, plumb-bob and builder's level; estimate and calculate the amount of materials needed for a project.

READING

Demonstrate ability to read and understand installation and equipment operation instructions, gauges, meters, safety signage, labels and laws, regulations and work policies.

HAND TOOLS

Recognize industry hand tools.

TRAFFIC CONTROL

Demonstrate basic understanding of traffic work zones, traffic control safety and traffic control personal protective equipment; obtain traffic control certification.

ADVANCED LEVELS FOR CONSTRUCTION CRAFT LABOR TRAINING INCLUDE:**POWER TOOLS**

Demonstrate ability to safely use various drills, concrete saw, ground fault interrupter, generator, air compressor, 90-pound pavement breaker, chipping gun, jackhammer, chain saw, compactor and all-purpose saw.

OXYFUEL CUTTING

Understand equipment and burning process of oxyfuel; conduct proper safety measures, maintenance of equipment; perform oxyfuel cutting.

SOIL COMPACTION

Recognize various types of soil and amount of moisture needed for compaction; understand lifts and how to maintain soil depth; demonstrate ability to use and maintain vibratory plate, ramming compactor and walk-behind roller.

SIGNALING

Demonstrate and understand proper hand signals for cranes and earth equipment.

HOISTING AND RIGGING

Demonstrate ability to properly inspect hoisting equipment and use hooks, shackles, thimbles and clips; demonstrate the bowline knot, clove hitch and half hitch; understand load weights, lifting capacities, tag lines and which material (synthetic sling, wire rope, chains, fiber and synthetic rope) to use for different hoisting situations.

BLUEPRINT READING

Read and interpret various types of drawings; identify symbols, abbreviations, elevations, utilities and structures.